

UNITED STATES SPECIFICATION

TO ALL WHOM IT MAY CONCERN:

BE IT KNOWN THAT I, Thorsten BRAUSEN a German citizen,
residing at Dahlhauser Höhe 40, D-44878 Bochum, Germany
have invented certain new and useful improvements in a

MUSCLE EXERCISING DEVICE FOR SPORTS FISHERMEN

of which the following is a specification.

CROSS REFERENCE TO RELATED APPLICATIONS

The applicant hereby claims priority under 35 U.S.C. 119 from German Patent No. 202 17 665.7 filed on November 15, 2002.

BACKGROUND OF THE INVENTION

The invention relates to muscle exercising devices, particularly those for deep-sea sports fishermen. During deep-sea sports fishing, so-called fighting chairs are used, which support the sports fisherman while landing the fish. The sports fisherman sits in the fighting chair, places his fishing rod into a sleeve on the fighting chair that is mounted to rotate, and casts the bait. After a bite, the sports fisherman begins to lever the fish out of the water with the fishing rod. In doing so, the sports fisherman first pulls the rod towards his body, against the resistance of the fish, and then moves it away from his body again, while at the same time winding up the fishing line.

To pull a fish on deck, the sports fisherman must repeat this sequence of motions, often over a long period of time. In doing so, stress is placed on muscle parts of the

sports fisherman that are used less frequently in daily life. The consequences for an unpracticed deep-sea sports fisherman are early exhaustion as well as muscle aches.

The sports fisherman is therefore supposed to be given the opportunity to exercise his muscles in advance of a fishing party. Known fishing rod simulators, such as to, U.S. Patent No. 4,637,603, are not well suited for this. Such devices have a complicated stress application device that, in the final analysis, puts stress on the fishing rod by way of a string. In this way, the fishing movements are replicated in particularly accurate manner, but this is not necessary for strengthening the sports fisherman's body.

SUMMARY OF THE INVENTION

The object of the invention is therefore a particularly simple and effective muscle exercising device for sports fishermen. The device comprises a frame with a seating surface and foot rests, both of which can be adjusted to the body dimensions of the sports fisherman. Furthermore, the device has a rod that is mounted to rotate in the frame, which represents the fishing rod set in place. A stress

application unit directly connects the rod and the frame. Suitable stress application units are possible in many different ways. A particularly simple and effective stress application unit, however, is formed from the combination of a spring and a pre-stress device. In this connection, the spring and the pre-stress device can have both a linear and a rotational effect. A linear arrangement can be implemented, for example, using a tension spring and a turnbuckle, which connect one end of the rod with the frame. A stress application device having a rotational effect is formed by arranging a torsion spring and a pre-stress device having a corresponding rotational effect between the rod and the frame. In both cases, the force that acts on the rod, which the sports fisherman must overcome for the purpose of exercising, increases in simple manner by increasing the pre-stress. In the case of a linear arrangement with a turnbuckle, the turnbuckle is merely tightened further for this purpose. As an alternative to the turnbuckle, an electronically controlled linear setting element can also be used. This would furthermore make it possible to store different exercise programs in the memory of an electronic control.

The invention is clarified using an exemplary configuration having a stress application device that acts in linear manner.

BRIEF DESCRIPTION OF THE DRAWINGS

Other objects and features of the present invention will become apparent from the following detailed description considered in connection with the accompanying drawing which discloses at least one embodiment of the present invention. It should be understood, however, that the drawing is designed for the purpose of illustration only and not as a definition of the limits of the invention.

In the drawing, wherein similar reference characters denote similar elements throughout the several views:

FIG. 1: is a side view of the exercising device; and

FIG. 2: is a top view of the exercising device.

DETAILED DESCRIPTION OF PREFERRED EMBODIMENTS

Turning now in detail to the drawings, FIG. 1 shows a side view of the exercising device. This comprises a frame 1, to which a seating surface 2, which is horizontally and vertically adjustable, is affixed. Likewise, foot rests 3, which are adjustable in the direction of the leg axis of the exercising sports fisherman, are affixed to the frame. These adjustment devices correspond to those of conventional fitness devices and are not an object of the present invention, for which reason they will not be described in greater detail here. The frame has a bearing site 4, in which rod 5 is mounted to rotate. The bearing point of rod 5 does not agree with the center point of the longitudinal axis of rod 5 (See also FIG. 2). In this way rod 5 is subdivided into a longer piece and a shorter piece. An eye 6 is arranged on the shorter end of rod 5, and a tension spring 7 is connected to this eye. Tension spring 7, in turn, is connected with a turnbuckle 8, which is the end piece connected with the frame 1.

The sports fisherman sits down on the exercising device and pulls the longer end of rod 5 towards his body. In doing so, he must overcome the resistance of the pre-stressed tension spring 7, thereby achieving the exercise effect for his muscles. To increase the exercise resistance, the sports fisherman further tightens turnbuckle 8.

In a further development of the exercising device that increases its ease of use, turnbuckle 8 is replaced with a commercially available, electronically controlled linear setting element. The sports fisherman therefore does not need to expend any muscle effort to vary the pre-stress of tension spring 7. Furthermore, the exercising device can be provided with a mini-computer in which exercise programs are stored in memory. Such a mini-computer would be able to control the load on rod 5 over time and, if necessary, also as a function of the pulse frequency of the sports fisherman or other variables. Such mini-computers are commonly used in known fitness devices and their configuration therefore does not have to be explained in detail.

Accordingly, while at least one embodiment of the present invention has been shown and described, it is to be understood that many changes and modifications may be made thereunto without departing from the spirit and scope of the invention as defined in the appended claims.